CLAIMS

The invention claimed is:

1. A set comprising:

an RF transponder to use with a toy;

at least two antennas to emit detection signals to the RF transponder; and

a multiplexer coupled to the two antennas to activate a first one of the antennas at a different time interval than a second one of the antennas.

2. The set of claim 1, wherein

the multiplexer is to activate periodically the first and the second antennas.

3. The set of claim 1, wherein

the antennas are coil antennas.

4. The set of claim 3, wherein

the coil antennas have single turn coils.

5. The set of claim 1, wherein

each of the antennas has a main axis, and

the antennas are oriented such that their respective main axes are not parallel to each other.

6. The set of claim 1, wherein

each of the antennas has a main axis, and

the antennas are oriented such that their respective main axes are substantially parallel to each other.

7. The set of claim 1, wherein

each of the antennas has a main plane, and

the antennas are oriented such that their respective main planes are substantially parallel to each other, but they do not belong in the same plane.

8. The set of claim 1, further comprising:

a program adapted to determine which one of the two antennas receives a return signal from the RF transponder.

9. A set comprising:

a toy figurine including an RF transponder;

at least two antennas to emit respective first and second detection signals at different times from each other;

an antenna reader to receive a return signal from the RF transponder responsive to one of the first and second detection signals.

10. The set of claim 9, further comprising:

an antenna driver; and

a multiplexer to receive a single antenna drive signal from the antenna driver, and to direct the antenna drive signal alternatingly between the first antenna and the second antenna to cause them to emit the first and second detection signals.

11. The set of claim 9, further comprising:

a program adapted to determine an identity of the toy figurine.

12. The set of claim 9, further comprising:

a program adapted to determine a location of the toy figurine.

13. A set for use with a program comprising:

a play device;

at least two antennas to emit respective first and second detection signals at different time intervals, the antennas positioned at first and a second antenna locations of the play device respectively;

a first toy to place on the play device including a first RF transponder to generate a first return signal in response to the first detection signal; and

a second toy to place on the play device including a second RF transponder to generate a second return signal in response to the second detection signal;

wherein the program is adapted to identify the first return signal with the first toy and the second return signal with the second toy.

14. The set of claim 13, further comprising:

an antenna driver; and

a multiplexer to receive a single antenna drive signal from the antenna driver, and to direct the antenna drive signal alternatingly between the first antenna and the second antenna to cause them to emit the first and second detection signals.

15. The set of claim 13, wherein

the program is adapted to determine first and second locations relative to the play device for the first and the second toys from the first and second return signals, respectively.

16. The set of claim 13, wherein

the first RF transponder has a first response characteristic,

the second RF transponder has a second response characteristic different from the first response characteristic, and

the program is further adapted to determine which of the first and second toys is at the first location.

17. The set of claim 9, wherein

the RF transponder is detachably connected to the toy figurine.

18. An article comprising: a storage medium, said storage medium having stored thereon instructions, that, when executed by at least one device, result in:

emitting a first detection signal from a first antenna;

emitting a second detection signal from a second antenna at a different time interval than emitting the first detection signal;

receiving a return signal from an RF transponder in response to one of the first and second detection signals; and

determining which one of the first and second antennas received the return signal.

19. The article of claim 18, wherein the instructions further result in:

determining a response characteristic of the return signal; and

matching the determined response characteristic with a response characteristic stored in a memory.

20. The article of claim 18, wherein the instructions further result in:

determining which antenna provided the return signal.

21. The article of claim 20, wherein the instructions further result in:

looking up a location of the antenna that provided the return signal.

22. A method comprising:

emitting a first detection signal from a first antenna;

emitting a second detection signal from a second antenna at a different time interval than emitting the first detection signal; and

receiving a return signal from an RF transponder in response to one of the first and second detection signals.

23. The method of claim 22, further comprising:

receiving a single antenna drive signal; and

multiplexing the antenna drive signal between the first antenna and the second antenna.

24. The method of claim 22, further comprising:

determining a location of the RF transponder from the return signal.

25. The method of claim 22, further comprising:

determining a response characteristic of the return signal; and

matching the determined response characteristic with a response characteristic stored in a memory.

26. The method of claim 22, wherein multiplexing the antenna drive signal is performed periodically.